



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION 5

77 WEST JACKSON BOULEVARD  
CHICAGO, IL 60604-3590

AUG 20 2012

REPLY TO THE ATTENTION OF:

Andrea Martin  
USDOT Federal Railroad Administration  
1200 New Jersey Avenue S.S., Mail Stop 20  
Washington, DC 20590

**Re: Comment on the Chicago to St. Louis High-Speed Rail Program  
Tier 1 Draft Environmental Impact Statement, CEQ # 20120213  
and the associated Volume II Springfield Rail Improvement Project  
Tier 2 Draft Environmental Impact Statement**

Dear Ms. Martin:

In accordance with U.S. Environmental Protection Agency (EPA) responsibilities under the National Environmental Policy Act (NEPA) and Section 309 of the Clean Air Act (CAA), we have reviewed the June 2012 Tier 1 Draft Environmental Impact Statement (DEIS) for the Chicago, Illinois to St. Louis, Missouri High Speed Rail (HSR) Program. The project proposes to improve public transportation service capacity, mode choice, rail speed and reliability for the Chicago to St. Louis corridor. Compared to the dominant mode of corridor travel, the automobile, HSR would improve safety and sustainability for travel along this urban linkage.

The Tier 1 DEIS describes the no-build alternative and identifies four build alternative routes for Amtrak passenger rail service between the Chicago Union Station and the St. Louis Gateway Multimodal Center. The HSR build proposals will further complete double tracking of the existing corridor right-of-way (ROW), add additional siding tracks, analyze further rail crossing upgrades (including at-grade crossings, separating rail, highway and pedestrian crossings, crossings of waterways and floodplains), and station improvements for additional passenger capacity, parking, and access at Joliet, Dwight, Pontiac, Normal, Lincoln, Carlinville and Alton, Illinois. Three major rail bridges are proposed for upgrade by this project; the 21st Street Bridge over the Chicago River, and the MacArthur and Merchant Bridges over the Mississippi River at St. Louis. It is not clear whether additional tracks to increase freight train capacities near St. Louis have been adequately represented in this DEIS. Page 6-28 clearly states some improvements are needed to accommodate both the anticipated rise in freight train numbers along with the HSR operations across the two Mississippi River bridges. Page 3-19 indicates a parallel maintenance access road will also be constructed along the entire length of the corridor.

The Tier 1 Final Environmental Impact Statement (FEIS) anticipates identifying all the potential impacts to human and natural resources these corridor improvements might cause. Subsequent

Tier 2 NEPA analysis and final design permitting would specify the actual impacts and mitigation for those impacts.

Some areas of potential impacts were well presented, e.g Parks under Section 4(f) of the Transportation Act, while the information on other areas was insufficient or had contradictions between the text and associated tables, e.g. Environmental Justice and Threatened and Endangered Species.

A second volume Tier 2 DEIS is provided in association with the Tier 1 DEIS. This second volume in essence is completion of a normal non-tiered EIS for the section of the HSR project passing through Springfield, Illinois. The Springfield Tier 2 DEIS specifically amends the Purpose and Need of the Tier 1 DEIS for the more specific Springfield segment of the project. The Springfield Tier 2 DEIS more fully describes the no-build and five potential build alternatives for this segment of the Chicago to St. Louis corridor, identified in the Tier 1 DEIS as Section 5. The Springfield Tier 2 DEIS selects two of those five build alternatives to carry forward to the Springfield Tier 2 FEIS. The Springfield Tier 2 DEIS subsequently presents the Affected Environment and Environmental Consequences for the no-build and the two build alternatives carried forward.

EPA Region 5 has participated in early project scoping on September 18, 2009, and agreed to be a Cooperating Agency on August 16, 2011. EPA involvement should be acknowledged in Appendix F: Agency Coordination. We later participated in phone conference call updates and encouraged establishing agency coordination meetings in a letter dated December 22, 2011. Due to the complexity of the project, these coordination meetings have helped clarify what the no-build alternative is, ongoing constructions of the no-build alternative projects in the corridor, and issues in the project corridor raised by these proposed Tier 1 and Tier 2 projects. The no-build projects are being built as a result of earlier NEPA analyses.

The following list of comments on Purpose and Need, Alternatives, Environmental Impacts, and Mitigation of Impacts presents the basis for our rating the Tier 1 DEIS and associated Springfield Tier 2 DEIS as EC-2, Environmental Concerns - Insufficient Information. See the attached Summary of Rating Definitions for an explanation of EPA's rating system. EPA recognizes the potential benefits a well planned high-speed rail mode alternative can provide to our region, including improved air quality, energy efficiency, and traveler safety.

## **PURPOSE AND NEED**

The background, current conditions and developing conditions that warrant considering the proposed HSR project are concisely presented and provide some clarification of this complex rail system.

We understand that the Purpose and Need for this proposal is not to improve freight train operations in this corridor and that simply acknowledging this connected action is sufficient and adequate at this point in the DEIS.

An increased ridership is projected for the 2030 horizon year. This raises some questions not addressed in the presentation. What is the minimum increase in ridership needed to support this project? Assuming the project is very successful in attracting new rail travelers, what maximum capacity will the proposed build rail system be able to accommodate? What is the ridership growth potential of this build proposal before additional system construction would be needed? If built as proposed, the projected ridership could vary dependent upon the fares charged. The DEIS indicates that this HSR proposal (maximum speed of 110 miles per hour) is an incremental step toward much higher speeds in the more distant future. The FEIS should discuss what factors would influence the pursuit of further upgrades to passenger train speeds in this corridor.

We recommend the Springfield Tier 2 DEIS Purpose and Need acknowledge the existing City of Springfield's planning goals of enhancing the City's Medical Center Campus and establishing a 10th Street Multimodal Center. These factors are subsequently used in the alternatives analysis as arguments for dropping alternatives.

## **ALTERNATIVES**

We commend the provision of screening selection comparison charts such as Table 3.3-3 and similar tables, Table 3-12, in the Springfield Tier 2 DEIS. They assist understanding what factors went into certain decisions.

Because both the Merchants and the MacArthur Bridges over the Mississippi River are to be reconstructed, the FEIS should clearly commit to both Alton to St. Louis alternatives and include the impacts of both bridge improvements in the environmental analysis.

## **ENVIRONMENTAL IMPACTS**

We appreciate that project impacts and costs are concisely summarized in Table 5.22-1.

***Freight Trains*** - The Purpose and Need section of the DEIS acknowledges the increased freight train operations associated with this project. However, the impacts of changes in freight operations are not discussed in the DEIS. These changes in freight operations include increase in the number of trains, length and speed of trains and shifts in time of day to accommodate HSR. These changes resulting from this project are direct impacts, add their own direct and indirect impacts, and should be fully addressed in the NEPA analysis. Section 6.3 (HSR train operations impacting freight rail service) does not address these project-related changes to freight operations. Subjects such as air quality, wildlife impacts, noise, vibration, crossing delays in urban and rural settings, and accident/spills/safety should be included in the impacts analysis. Regarding HSR impacts on freight trains, we recommend the FEIS include discussion of the compression wave and air turbulence impacts of HSR trains on passing freight trains, particularly those trains carrying containers. This air turbulence should also be discussed for its potential impacts to pedestrians (flying debris) and vehicles at crossings.

**Major Bridges** - The DEIS describes some design consideration for the three major river crossing bridges, the Chicago River at 21st Street and the St. Louis Merchants and MacArthur bridges over the Mississippi River, but impacts are not addressed. We recommend the FEIS specify all impacts associated with these reconstructions.

**Access Road** - There is no DEIS discussion concerning impacts related to the access road to be constructed the entire length of the rail corridor, which is mentioned on page 3-19. While such a road may be simple by comparison to the railroad work, this should be studied to assure possible impacts are fully considered. One area may be threatened and endangered species and their habitats. Other topics that should be addressed in the NEPA documents for this construct include but are not limited to waterway crossings where applicable, stormwater runoff, dust particulate matter and safety.

A significant number of Special Waste sites are noted within 200 feet of the rail right-of-way (ROW) (Table 5.14-2 and Appendix D). Most of these will only be a problem if construction disturbs them, and this is one specific reason the access road needs to be included in this NEPA analysis.

**Threatened and Endangered Species** - Summary information on page S-11 and Section 5.6.2.3 addresses impacts to threatened and endangered species. After acknowledging critical habitat impacts and potential increased direct hit losses for the federally listed Hine's emerald dragonfly in proposed Section 1, between Chicago and Joliet, the summary concludes "that this potential increase would have a minimal overall impact on the species." The DEIS does not provide information to support such a statement. The DEIS states, based upon computer database research, "there are no other critical habitats or known habitats or populations of other federally listed species located within the study corridor that could be impacted by any program alternatives. However, this Tier 1 level of documentation did not include detailed fieldwork to identify potential habitats and/or populations of threatened and endangered species."

Table 5.6-3 and Exhibit 5.6-1 indicate that there is some knowledge of State Threatened and Endangered Species along the corridor south of Joliet. While the project intent is to remain on existing ROW, we recommend that FRA undertake a field analysis in this area. We believe gathering such information is prudent now so that options to avoid, minimize or mitigate impacts can be considered in the FEIS. We are concerned about construction impacts to species of concern within the existing ROW. A fuller identification of these sites may find areas adjacent to the ROW are also of concern.

**Migratory Birds** - The DEIS analysis does not address protection of migratory birds, which is a concern for the corridor. Recent studies by the Illinois Natural History Survey (INHS) confirm that railroad corridors do have an impact on wildlife including migratory birds. We recommend further coordination with FWS and IDNR to address these impacts, including but not limited to impacts at the Midewin National Tallgrass Prairie.

**Environmental Justice** - The DEIS provides limited information on Environmental Justice (EJ). The EJ Section simply identifies the number of qualifying EJ census blocks, with no

accounting for numbers of people or households in those census blocks that may be impacted, Table 5.2-1. The DEIS lacks support for a conclusion of "no disproportionate impacts."

***Sensitive Noise Receptors*** - The noise and vibration impacts to receptors, especially EJ communities, are important. We commend the construction and operation reductions and mitigations presented on pages 5-54 through 5-58, and recommend these be clearly committed to in the FEIS. However, the noise analysis in Section 5.8.3 only considers train horn noise, and does not include the rail / wheel noise and distinct HSR noise(s) of operating trains at faster speeds. Here again, the freight traffic with heavy loads will contribute differently than the HSR trains and should be included in these DEIS impacts. We recommend the FEIS clearly delineate all project noise and vibration, so that impacts to sensitive community facilities and wildlife can be appropriately considered both in terms of decibels and increased numbers of HSR and freight trains.

The DEIS is unclear as to the distance from the HSR corridor that was analyzed for sensitive receptors. Please clarify this in the FEIS.

***At-Grade Crossings*** - Appendix E presents the extensive list of rail crossings through the entire corridor. Most are grade separated and some additional ones, such as in Springfield, are being considered for grade separation. We recommend the FEIS discuss how increased speed and frequency of trains will affect users of the many at-grade private or commercial "access crossings."

***Surface Water Crossings*** - Some of the 216 stream crossings will be replaced and others lengthened to accommodate the additional tracks. We recommend the FEIS commit to using bridging and/or three-sided open bottom culverts for waterway crossings wherever possible, to retain natural functions and avoid disturbing stream beds.

***Sustainability*** - We commend your agency for its consideration of sustainability concepts, Section 6.1.1.4, and recommend those concepts be clearly committed to in the FEIS and included in project contracting documents. These include commitments to maintenance, energy efficiency, water use minimization, green buildings, and corridor development synergies.

## **MITIGATION OF IMPACTS**

We commend the inclusion of Table S.5-1 as a concept. We recommend it be expanded in the FEIS to list all project mitigation commitments and their associated implementation schedules, locations, responsible parties, and monitoring/maintenance/adaptive management.

The DEIS mentions wellhead protection areas as a concern, but does not discuss how the proposal will avoid, minimize, mitigate impacts to wellhead protection areas. While these may be Tier 2 level details for final resolution, the Tier 1 document should discuss how these might be approached.

We commend the DEIS for its many clear and helpful exhibits. However, some exhibits are too small or poorly labeled to convey adequate information, including but not limited to: Exhibits 6.1-6 and 6.1-8 and the Springfield Tier 2 DEIS Exhibits 4-4 and 4-5. The Tier 1 DEIS includes stringline diagrams, Exhibits 6.1-4, through 6.1-9, which are more appropriately put in a technical appendix, as they are not self-explanatory to the general reader. The Springfield Tier 2 DEIS exhibits in Section 5 are insufficiently labeled to clearly describe the alternatives.

We appreciate the opportunity to review these documents. We look forward to coordinating with and providing feedback on the Chicago to St. Louis HSR Program as they are progressively developed. Please send me a hard copy and two CD digital copies of each NEPA document related to these projects. If you have any questions, or wish to discuss our comments further, please contact me or Norm West of my staff at (312)-353-5692 or at [west.norman@epa.gov](mailto:west.norman@epa.gov).

Sincerely,

A handwritten signature in black ink, appearing to read "Kenneth A. Westlake", written over a horizontal line.

Kenneth A. Westlake  
Chief, NEPA Implementation Section  
Office of Enforcement and Compliance Assurance

Enclosure: EPA Summary of Rating Definitions

Cc: Joseph E. Shacter, IDOT

## **SUMMARY OF RATING DEFINITIONS AND FOLLOW UP ACTION\***

### **Environmental Impact of the Action**

#### LO-Lack of Objections

The EPA review has not identified any potential environmental impacts requiring substantive changes to the proposal. The review may have disclosed opportunities for application of mitigation measures that could be accomplished with no more than minor changes to the proposal.

#### EC-Environmental Concerns

The EPA review has identified environmental impacts that should be avoided in order to fully protect the environment. Corrective measures may require changes to the preferred alternative or application of mitigation measures that can reduce the environmental impacts. EPA would like to work with the lead agency to reduce these impacts.

#### EO-Environmental Objections

The EPA review has identified significant environmental impacts that must be avoided in order to provide adequate protection for the environment. Corrective measures may require substantial changes to the preferred alternative or consideration of some other project alternative (including the no action alternative or a new alternative). EPA intends to work with the lead agency to reduce these impacts.

#### EU-Environmentally Unsatisfactory

The EPA review has identified adverse environmental impacts that are of sufficient magnitude that they are unsatisfactory from the standpoint of public health or welfare or environmental quality. EPA intends to work with the lead agency to reduce these impacts. If the potential unsatisfactory impacts are not corrected at the final EIS state, this proposal will be recommended for referral to the CEQ.

### **Adequacy of the Impact Statement**

#### Category 1-Adequate

The EPA believes the draft EIS adequately sets forth the environmental impact(s) of the preferred alternative and those of the alternatives reasonably available to the project or action. No further analysis or data collecting is necessary, but the reviewer may suggest the addition of clarifying language or information.

#### Category 2-Insufficient Information

The draft EIS does not contain sufficient information for the EPA to fully assess the environmental impacts that should be avoided in order to fully protect the environment, or the EPA reviewer has identified new reasonably available alternatives that are within the spectrum of alternatives analyzed in the draft EIS, which could reduce the environmental impacts of the action. The identified additional information, data, analyses, or discussion should be included in the final EIS.

#### Category 3-Inadequate

EPA does not believe that the draft EIS adequately assesses potentially significant environmental impacts of the action, or the EPA reviewer has identified new, reasonably available alternatives that are outside of the spectrum of alternatives analyzed in the draft EIS, which should be analyzed in order to reduce the potentially significant

environmental impacts. EPA believes that the identified additional information, data analyses, or discussions are of such a magnitude that they should have full public review at a draft stage. EPA does not believe that the draft EIS is adequate for the purposes of the NEPA and/or Section 309 review, and thus should be formally revised and made available for public comment in a supplemental or revised draft EIS. On the basis of the potential significant impacts involved, this proposal could be a candidate for referral to the CEQ.

\*From EPA Manual 1640 Policy and Procedures for the Review of the Federal Actions Impacting the Environment